

costs exceeded the weighted DRG cost by €1396 for the public and €813 for the private hospital. Overall endophthalmitis costs were euro 4125. Using DRG 60 (Severe acute ocular infections) as a proxy of endophthalmitis would underestimate dramatically (>45%) its cost. Endophthalmitis expenses were estimated at €6,509,000 for the French Health Care System. **CONCLUSION:** Using DRG 60 as a proxy of endophthalmitis in health economics evaluation to estimate the hospital true cost is inappropriate. The PMSI clustering algorithm underestimates the budget allocation required to treat endophthalmitis in the public and private sectors. The PMSI (reporting exhaustively all hospitalisations) could be used to better capture the yearly endophthalmitis incidence rate.

## PEY16

**THE PREVALENCE AND COST OF TREATMENT OF PATIENTS TAKING ANTIGLAUCOMA AGENTS FOR GLAUCOMA OR OCULAR HYPERTENSION IN FRANCE**

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**OBJECTIVE:** The aim of the study was to estimate the prevalence of patients treated with antiglaucoma agents for glaucoma or ocular hypertension in France, and the cost of treatment over one year. **METHOD:** Prevalence was estimated using a permanent panel of subjects affiliated to a French national health insurance scheme, the EPAS panel. Patients with glaucoma or ocular hypertension (OHT) were identified by the prescription of antiglaucoma preparations and miotics (ATC code S01E). Chronic patients were defined as those who had been prescribed at least three boxes during the year. The three years 2001, 2002 and 2003 were studied to check the stability of estimations. The cost of treating ambulatory patients was estimated using data from the EPAS panel on consultations, specialist procedures and drug prescriptions. The cost of inpatient care over the three years 2001 to 2003 in public and private hospitals for patients with a principal diagnosis of glaucoma was estimated using PMSI data (a French system of recording hospital procedures performed on given patient groups), the French national cost study and the approved tariffs for the private sector. **RESULTS:** The estimated prevalence was stable over 3 years, between 1.1 to 1.2 million patients. The average age of patients was 71 years for women and 67 for men. The average cost, for social security, per patient for ambulatory care was €291 in 2003, €204 of which was for drug prescriptions. About 1.2% of patients were hospitalised and the average cost per patient was €26. In one in three cases, glaucoma surgery was accompanied by lens surgery. The total spending on treatment in 2003 was €382 million. **CONCLUSION:** The study confirms that glaucoma is a major eye disease. The cost of disease across three years seems to be stable.

## PEY17

**MODELING TREATMENTS FOR SUBFOVEAL CHOROIDAL NEOVASCULARIZATION SECONDARY TO AGE RELATED MACULAR DEGENERATION: COST-EFFECTIVENESS METHODS**

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**OBJECTIVE:** Licensing and reimbursement decisions for age-related macular degeneration (AMD) therapies may be driven by different cost and outcome relationships across payers and thus

any model should be flexible to accommodate these variances transparently. **METHODS:** To accurately assess cost-effectiveness of treatment as desired by European countries, a comprehensive model considering all direct costs is important. A Markov framework was used to model a cohort's lifetime movement through visual acuity (VA) states of >20/40, 20/40 to >20/80, 20/80 to >20/200, 20/200 to >20/400, and >20/400. Presenting lesion subtypes (i.e., predominately classic, minimally classic, and occult) were considered. Unlike previous models, patients could experience more than one gain or loss of VA over their lifetimes. This comprehensive model was initially populated from a US perspective. Drug, procedure, monitoring, outpatient, vision rehabilitation, and adverse events (AEs) costs were obtained from standard US published sources. Expert interviews were conducted to determine AE treatment patterns and vision rehabilitation resource use. Relative risks and costs associated with effects associated with declining VA were extracted from a Medicare analysis. Efficacy data was taken from published literature for two years of treatment for all lesion subtypes. Efficacy beyond two years was extrapolated from clinical trials. Utilities were taken from similar published sources as previous models. **RESULTS:** Results are expressed as vision years, quality-adjusted life years (QALYs), drug, treatment, AE, and other costs as well as incremental cost per vision year and QALY gained. Outcomes were discounted 3% per annum. This model is more robust than previous models as patient movement is not limited and represents natural disease progression over a lifetime, costs attributed to declining VA are included, and all lesion subtypes have been analyzed. **CONCLUSIONS:** Thus, cost-effectiveness of treatment of AMD with respect to differing licensing and reimbursement is more accurately analyzed.

## PEY18

**USING DISCRETE CHOICE EXPERIMENTS TO ESTIMATE QUALITY WEIGHTS WITHIN THE FRAMEWORK OF QALYS: AN APPLICATION TO GLAUCOMA**

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**OBJECTIVES:** While standard gamble and time trade off are commonly used to estimate quality weights within the Quality Adjusted Life Year (QALY) framework, a potentially useful technique is discrete choice experiments (DCEs). Whilst DCEs have been extensively used in health economics, their application to estimate quality weights is limited. Here we report the results of a study using the DCE methodology to derive a utility scale for patients with glaucoma. **METHODS:** Based on qualitative research, literature reviews, expert opinion and validated profile tools, a 6-dimensional glaucoma profile outcome measure was developed. The six dimensions were: "central and near vision", "lighting and glare", "outdoor mobility", "activities of daily living", "local eye discomfort" and "other effects of glaucoma and its treatment". Levels assigned to each dimension were: "no difficulty"; "some difficulty"; "quite a lot of difficulty" and "severe difficulty". Experimental design techniques, ensuring the properties of orthogonality, minimum overlap and level balance, were used to derive a sample of the outcome states for which preferences were elicited. A face-to-face questionnaire was administered to subjects from clinics in Aberdeen and Leeds. In addition, a postal questionnaire was sent to patients with glaucoma, self selected from the International Glaucoma Association. Response data were analysed using logistic regression techniques. **RESULTS:** Weights were estimated for all parameters of the model (all levels of all dimensions), and from this a normalised utility score was estimated, anchored between zero (worst level of all attributes) and one (best level of all attributes).